

IAP5 Rec'd PCT/PTO 31 JUL 2006

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Serial No. : Unassigned  
Applicant : William Ogilvie  
Filed :  
Group Art Unit:  
Examiner :  
Docket No. : GJE-004  
Customer No. : 021884  
Title : METHOD AND APPARATUS FOR THE MANUFACTURE OF  
ELECTRIC CIRCUITS

**INFORMATION DISCLOSURE STATEMENT**

Commissioner for Patents  
PO Box 1450  
Alexandria, VA 22313-1450

Sir:

In accordance with the duty of disclosure provisions of 37 CFR § 1.56, there is hereby provided certain information which the Examiner may consider material to the examination of the subject U.S. patent application. It is requested that the Examiner make this information of record if it is deemed material to the examination of the subject application.

1. Enclosures accompanying this Information Disclosure Statement are:

- 1a. ☒ Form PTO-1449.
- 1b. ☒ Copy(ies) of IDS citation(s), except for U.S. Patents and U.S. Patent Application publications for applications filed on or after June 30, 2003.
- 1c. ☒ English language copy of a communication(s) from a foreign Patent Office or a PCT International Search Report.
- 1d. ☐ English language translation (complete, Abstract, or relevant portion(s)) attached to non-English language publications as indicated on the attached PTO Form PTO-1449.
- 1e. ☐ Explanations of Relevancy of References (ATTACHMENT 1(e), hereto) for providing a concise explanation of non-English publications.
- 1f. ☐ List of Copending Applications (ATTACHMENT 1(f), hereto).

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- 1g. ☐ List of Additional Submitted Documents (ATTACHMENT 1g), hereto).
2. ☒ This Information Disclosure Statement is filed under 37 CFR § 1.97(b):  
*(Check either Item 2a or 2b or 2c or 2d)*
- 2a. ☒ Within three months of the filing date of a national application;
- 2b. ☐ Within three months of the date of entry of the national stage as set forth in § 1.491 in an international application.
- 2c. ☐ Before the mailing of a first Office Action on the merits; or
- 2d. ☐ Before the mailing of a first Office Action after the filing of a Request for Continued Examination under § 1.114.
3. ☐ This Information Disclosure Statement is filed under 37 CFR § 1.97(c) after the period specified in paragraph 2 above but before the mailing date of any of a Final Office Action under § 1.113, a Notice of Allowance under § 1.311 or an action that otherwise closes prosecution in the application, AND  
*(Check either Item 3a or 3b; Item 3b to be checked if any reference known for more than 3 months)*
- 3a. ☐ The § 1.97 (e) Statement in Item 5 below is applicable; OR
- 3b. ☐ The \$180.00 fee set forth in 37 CFR § 1.17(p) is:  
☐ enclosed.  
☐ to be charged to Deposit Account No. 01-2221.
4. ☐ This Information Disclosure Statement is filed under 37 CFR § 1.97(d) after the period specified in paragraph 3 above, but on or before payment of the Issue Fee, AND
- 4a. ☐ The § 1.97(e) Statement in Item 5 below is applicable; AND
- 4b. ☐ The \$180.00 fee set forth in 37 CFR § 1.17(p) is:  
☐ enclosed.  
☐ to be charged to Deposit Account No. 01-2221.
5. ☐ Statement under § 1.97(e) *(applicable if Item 3a or 4a is checked)*  
*(Check either Item 5a or 5b)*
- 5a. ☐ In accordance with 37 CFR § 1.97(e)(1), it is stated that each item of information contained in this Information Disclosure Statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of this Information Disclosure Statement.
- 5b. ☐ In accordance with 37 CFR § 1.97(e)(2), it is stated that no item of information contained in this Information Disclosure Statement was first cited in a communication from a foreign patent office in a counterpart foreign application and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in this Information Disclosure Statement was known by any individual designated in § 1.56(c) more than three months prior to the filing of this Information Disclosure Statement.

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6. ☐ This is a continuation/division/continuation-in-part application under 37 CFR § 1.53(b).  
(Check appropriate Items 6a and/or 6b).
- 6a. ☐ Copies of the publications listed on the attached Form PTO-1449 which were previously cited in prior application Serial No. \_\_\_\_\_, filed on \_\_\_\_\_, and which is relied on for an earlier effective filing date for the subject application under 35 U.S.C. § 120, have been omitted pursuant to 37 CFR § 1.98(d).
- 6b. ☐ Copies of the publications listed on the attached Form PTO-1449 which were not previously cited in prior application Serial No. \_\_\_\_\_, filed on \_\_\_\_\_, and which is relied on for an earlier effective filing date for the subject application under 35 U.S.C. § 120, are provided herewith.
7. ☐ This is a Request for Continued Examination under 37 CFR § 1.114.  
(Check either Item 7a or 7b)
- 7a. ☐ The Issue Fee has not been paid.
- 7b. ☐ A Petition to Withdraw from issue under 37 CFR § 1.313(c) is filed concurrently herewith or has been granted. A Request for Continued Examination under 37 CFR § 1.114, after payment of Issue Fee, is proper in accordance with 37 CFR § 1.114(a), respectively.
8. ☐ This is a Supplemental Information Disclosure Statement  
(Check either Item 8a or 8b)
- 8a. ☐ This Supplemental Information Disclosure Statement under 37 CFR § 1.97(f) supplements the Information Disclosure Statement filed on \_\_\_\_\_. A bona fide attempt was made to comply with 37 CFR § 1.98, but inadvertent omissions were made. These omissions have been corrected herein. Accordingly, additional time is requested so that this Supplemental IDS can be considered as if properly filed on \_\_\_\_\_.
- 8b. ☐ This Supplemental Information Disclosure Statement is timely filed within one (1) month of the Notice under 37 CFR §§ 1.97 and 1.98, mailed \_\_\_\_\_.
9. ☒ In accordance with 37 CFR § 1.98, concise explanation of what is presently understood to be the relevance of each non-English publication is:  
(Check appropriate Items 9a, 9b, 9c and/or 9d)
- 9a. ☒ satisfied for the non-English language publication(s) cited on the enclosed "English language version of the search report or action which indicates the degree of relevance found by the foreign office". (See MPEP § 609, Minimum Requirements for an Information Disclosure Statement, Part A(3): Concise Explanation of the Relevance, 8<sup>th</sup> Ed., Rev. 2)
- 9b. ☐ set forth in the application.
- 9c. ☐ satisfied for the non-English language publication(s) indicated on the attached Form PTO-1449 as having an English language translation (complete or relevant portion(s)) attached thereto.
- 9d. ☐ enclosed as Attachment (1(e), hereto).

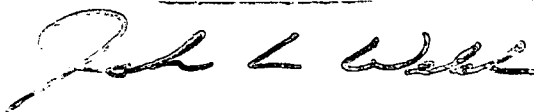
**10/587912**

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10. No admission is made that the information cited in this Statement is, or is considered to be, material to patentability nor a representation that a search has been made (other than search report(s) from a counterpart application or a PCT International Search Report, if submitted herewith). 37 CFR §§ 1.97(g) and (h).

11. The Commissioner is authorized to credit any overpayment or charge any additional fee required under 37 CFR § 1.17 for this Information Disclosure Statement to Deposit Account 01-2221.

Respectfully submitted,



John L. Welsh  
Registration No. 33,621

WELSH & FLAXMAN LLC  
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(703) 920-1122

Receipt date: 07/31/2006

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PTO/SB/08A (07-05)

Approved for use through 07/31/2006. OMB 0651-0031

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Substitute for form 1449/PTO

**INFORMATION DISCLOSURE  
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)

Sheet 1 of 3

**Complete if Known**

Application Number	Unassigned <b>10/587912</b>
Filing Date	
First Named Inventor	William Ogilvie
Art Unit	
Examiner Name	
Attorney Docket Number	GJE-004

**U. S. PATENT DOCUMENTS**

Examiner Initials*	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code <sup>2</sup> (if known)			
		US- 6074135	06/13/2000	Tapphorn et al.	
		US- 6139913	10/31/2000	Van Steenkiste et al.	
		US- 6402050	06/11/2002	Kashirin et al.	
		US- 5302414	04/12/1994	Alkhimov et al.	
		US-			
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**FOREIGN PATENT DOCUMENTS**

Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T <sup>6</sup>
		Country Code <sup>3</sup> -Number <sup>4</sup> -Kind Code <sup>5</sup> (if known)				
		EP1365637	11/26/2003	Delphi Technologies Inc.		
		DE10007981	11/02/2000	Yazaki Corp.		
		JP01084690	03/29/1989	Matsushita Electric Works		
		WO 00/43571	07/27/2000	Nikitin Peter Vasilievich		✓
		WO 02/068245	09/06/2002	Leoni Bordnetz Systeme GM		✓
		EP0484533	05/13/1992	Inst Teoreticheskoi		✓

Examiner  
Signature

/Brian Talbot/

Date  
Considered

06/01/2010

\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. <sup>1</sup> Applicant's unique citation designation number (optional). <sup>2</sup> See Kinds Codes of USPTO Patent Documents at [www.uspto.gov](http://www.uspto.gov) or MPEP 901.04. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. <sup>5</sup> Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. <sup>6</sup> Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /BT/

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**Complete if Known**

**(Use as many sheets as necessary)**

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William Ogilvie
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GJE-004
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FOREIGN PATENT DOCUMENTS						
Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T <sup>6</sup>
		Country Code <sup>3</sup> -Number <sup>4</sup> -Kind Code <sup>5</sup> (if known)				
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06/01/2010

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Receipt date: 07/31/2006

10587912 - GAU: 1715

Approved for use through 07/31/2006. OMB 065-0006  
 IAD587912 PTO 31 JUL 2006  
 U.S. Patent and Trademark Office, U.S. DEPARTMENT OF COMMERCE

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Substitute for form 1449/PTO  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  (Use as many sheets as necessary)		<b>Complete if Known</b>	
		Application Number	Unassigned <b>10/587912</b>
		Filing Date	
		First Named Inventor	William Ogilvie
		Art Unit	
		Examiner Name	
Sheet 3	of 3	Attorney Docket Number	GJE-004

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T <sup>2</sup>
		McCune RC et al., "Characterization of Copper Layers Produced by Cold Gas-Dynamic Spraying", JOURNAL OF THERMAL SPRAY TECHNOLOGY, Vol. 9, No. 1, March 2000 pgs. 73-82	

Examiner Signature	/Brian Talbot/	Date Considered	06/01/2010
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\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

1 Applicant's unique citation designation number (optional). 2 Applicant is to place a check mark here if English language Translation is attached. This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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